

**REMARKS**

Claims 1-40 are pending in the application. Claims 1, 3, 5, 6, 11, and 15-40 are withdrawn from consideration. Claims 2, 4, 7-9, and 12-14 are rejected.

This Amendment is in response to the Office Action dated September 15, 2008. In view of the amendments presented above and the detailed comments presented below, favorable reconsideration of the application is respectfully solicited.

Independent claims 2 and 4 are amended.

New claims 41-42 are added.

**CLAIM REJECTIONS UNDER 35 U.S.C. §102**

The Examiner rejected claims 2, 4, 7-9 and 12-14 over Richardson (U.S. PGPUB 2003/0156605).

In applicant's response dated June 27, 2008 it was requested that the examiner address, point-by-point, where each of the claimed elements is identically disclosed in the reference. Applicant respectfully submits that the present office action does not set forth which parts of the reference are being applied. Therefore, applicant is uncertain which teachings of the reference are being relied on for the following rejections.

***A. The Examiner's Claim Language Interpretations***

The Examiner has provided a lengthy section explaining the manner in which he has interpreted various words and phrases in the claims. This section is illuminating, in that it reveals that, in the Examiner's lexicon, "pre-tested" means "choosing the element", a "tap unit"

is a “leaky fiber” and “selected” surprisingly can mean “not selected”. This section also reveals that the Examiner regards several of Applicant’s limitations as statements of intended use only.

Applicants submit that the claims recite structures which are neither disclosed nor suggested by Richardson. The differences between the claims and Richardson are expanded upon below, in brief:

**Claim 2:** This claim is directed to replaceable modules, which are neither disclosed nor suggested in Richardson. Richardson says nothing concerning modularity and contains no indicia of modularity such as the functional segmentation, integration or componentization evidenced in the present application. Another aspect not evidenced by Richardson is the spectral filtering for oscillator/amplifier matching present in claim 2. Accordingly, Richardson is not anticipatory of claim 2 for at least the above reasons.

**Claim 4:** Similarly to claim 2, and building upon the former claim, claim 4 requires “*pre-tested modules*”. The Examiner characterizes this limitation as “intended use/outcome” functional language. Applicant disagrees with the characterization. “*Pre-tested*” describes a property or state of being of the integrated module. Richardson discloses neither the use of modules nor the pre-testing of the same.

Richardson further fails to disclose a system wherein at least the signal source, stretcher, fiber amplifier and AOM are individually coupled into the system via simple fiber splices. This feature is simply not suggested by the reference.

Still further, Richardson contains no disclosure of at least one tap unit within or between ones of said modules, including means for picking off a portion of the signal, to enable measurement of a spectrum within or between said modules, where there is at least one spectral

filter narrowing the spectrum of the signal source, and at least one of said tap units is located downstream of this filter. Even if one discounts the purpose of the tap unit as being an expression of intended use, it is evident that “inherent leakage” cannot satisfy this limitation. “Inherent leakage” does not constitute a tap unit. Further, there is no “means for picking off” a signal in the “inherent leakage” scenario. Applicant notes further that this element is presented in means plus function form, and thus the examiner must directly consider the structure disclosed in the specification which performs the pick-off function. There is no equivalency between “inherent leakage” and the structure disclosed. Finally, there is no spectral filter for narrowing the signal source spectrum in Richardson, nor is there a tap located beyond this narrowing element so that the narrowed spectrum can be measured.

Moreover, if the examiner is suggesting the features are *inherent* the examiner must show that the structure necessarily follows from the disclosure of Richardson. Applicant submits the features are not inherent.

With respect to the forgoing highlighted elements of the claims, Applicants submit that the cited Richardson reference fails to qualify as an anticipatory teaching in that its disclosure cannot meet the required test: “*Anticipation requires every element of the claimed invention must be identically shown in a single reference... and must be arranged as in the claim under review*”.

Further, with respect to claims which recite features in “means plus function” form, the Examiner has made no effort to show where Richardson teaches such structure and function, *as would be required for anticipation of a means-plus-function claim.* (“To anticipate a claim reciting a means-plus-function limitation, the anticipatory reference must disclose the recited

function identically”, *Transclean Corp. v. Bridgewood Services Inc.* , 290, F.3d 1364, 62 USPQ2d 1865 (Fed Circ. 2002)

Finally, to the extent that the Examiner is suggesting that certain features are *inherent*, the Examiner has failed to show that the claimed structure necessarily follows from the disclosure of Richardson.

When the disclosure of Richardson is properly assessed, Applicants believe that it will be apparent that the claims of the present application, and particularly those enumerated above, are clearly not anticipated by this reference.

**B. Claim Amendments**

Notwithstanding the above, applicant has amended the claims to expedite prosecution, and without prejudice.

Independent claim 2 is amended and now recites: “*a spectral filter module placed before or after said stretcher module and external to said oscillator module, said spectral filter module optically connected to said ultrafast oscillator module and comprising at least one spectral filter having a wavelength sensitive characteristic that modifies a spectral shape of an output from said ultrafast oscillator, including a spectral width of said output*”. Such a module is not disclosed in Richardson. The language clearly recites structure separate from the amplifier or oscillator, and renders moot the examiner’s rejection based on any filtering action of the amplifiers.

Independent claim 4 is also amended to more particularly recite structural features, and eliminates the recitation of “*provided as*” and “*individually connected*”. The amended claim also recites: “*said at least one spectral filter being disposed external to said source and said fiber*

*amplifier, and either before or after said stretcher, said filter having a wavelength sensitive characteristic that modifies a spectral shape of an output from said signal source and narrows the spectrum of the signal source output".*

The remaining active claims are dependent on one of claim 2 or 4, and therefore not anticipated.

New claims 41 and 42 are added.

Support for the amended and new claims is found in at least paragraphs [0059] and [0069], and Fig. 5(b) , Fig. 11., and Figs. 12A and 12B.

#### **COMMENTS ON THE RESPONSE TO APPLICANT'S ARGUMENTS**

The Examiner's anticipation rejections are addressed in the paragraphs above.

As to the questions related to assembly and test and the requirements of alignment, it appears there is a misunderstanding regarding the state of this technology prior to and after the present invention. The specification provides guidance regarding the problems faced by the inventors and the solutions.

Applicants' response dated June 27, 2008 pointed out portions of the specification supporting modularity, integration, and pre-testing. The Office Action states Applicant's latter quoted sentence directly contradicts Applicant's former quoted sentence (*Office Action, Page 4*).

The examiner has apparently misperceived Applicant's arguments. Applicant believes at least paragraphs [0001], [0012]-[0016] and [0020]-[0022] point out features and techniques disclosed in the present application that allow laser units of the present type to be manufactured in quantity. Moreover, as stated in paragraph [0001], the present invention uses state-of-the-art

technologies to build an all-fiber chirped pulse amplification system suitable for industrial applications. Applicants submit the present application provides solutions to the problems and particular difficulties identified in the prior art to achieve this end.

These paragraphs, as examples, explicitly point out the relevant needs and various problems solved with the present invention. Applicant therefore submits that the examiner's questions regarding assembly and test are fully addressed within the four-corners of the specification.

In view of the foregoing, Applicants solicit favorable reconsideration of the application and the currently active claims.

If any points remain in issue which the Examiner feels may be best resolved through a personal or telephone interview, the Examiner is kindly requested to contact the undersigned at the telephone number listed below.

The USPTO is directed and authorized to charge all required fees, except for the Issue Fee and the Publication Fee, to Deposit Account No. 19-4880. Please also credit any overpayments to said Deposit Account.

Respectfully submitted,

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